

REMARKS

The Examiner is thanked for the thorough examination of the application.

Claims 1-5 are pending in the application. Claim 1 has been amended in light of the recommendations set forth in the Official Action, and thus no new issues are raised. Claims 2-4 have been amended to improve their language in a non-narrowing fashion. Entry of this Amendment under 37 C.F.R. §1.116 is therefore proper by virtue of placing the application in condition for allowance, by reducing issues for appeal, and by complying with a matter of form set forth in the Official Action.

Rejection Under 35 USC §112, Second Paragraph

Claims 1-5 have been rejected under 35 USC §112, second paragraph as being indefinite. This rejection is respectfully traversed.

The Official Action asserts that the alternative embodiments in claim 1 are not clearly set forth. The comments have been considered, and claim 1 has been amended in accordance with the recommendations. The claims are thus clear, definite and have full antecedent basis.

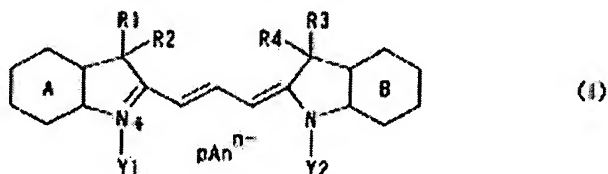
This rejection is believed to be overcome, and withdrawal thereof is respectfully requested.

Rejection Under 35 USC §103(a)

Claims 1-5 have been rejected under 35 USC §103(a) as being unpatentable over any one of JP '510 (JP 2000-108510), JP '233

(JP 2000-168233) or JP '335 (JP 2000-289335) in view of JP '426 (JP 10-278426), the abstract of JP '793 (JP 03-224793) and JP '746 (JP 58-021746). This rejection is respectfully traversed.

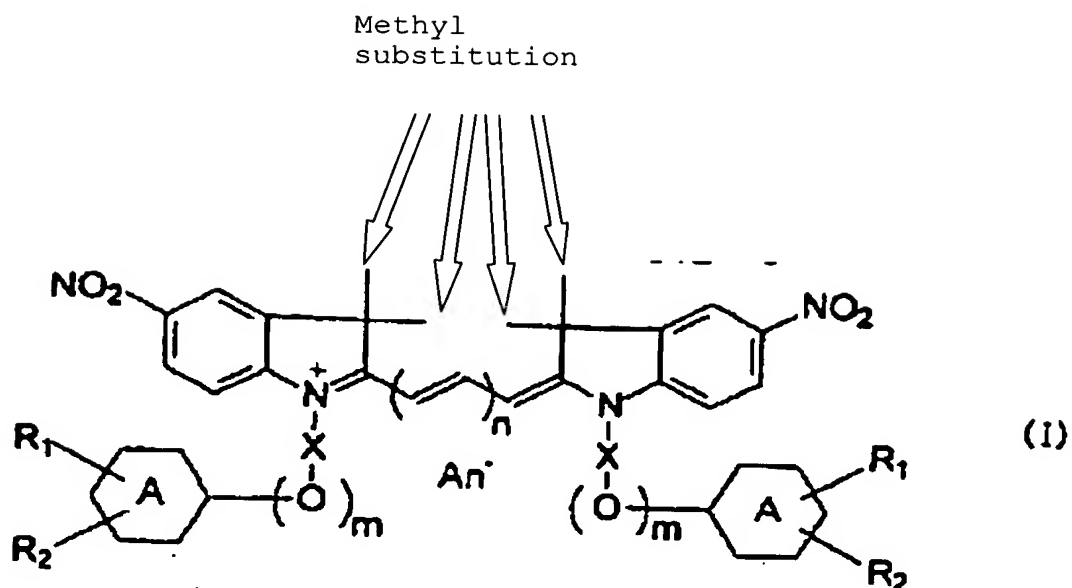
The present invention pertains to a cyanine compound of the general formula (1):



Claim 1 of the present invention sets forth, in part:

at least one of the pair of adjacent groups R1 and R2 and the pair of adjacent groups R3 and R4 represent a pair of benzyl groups, and the other paired groups each represent an alkyl group having 1 to 4 carbon atoms or are connected to each other to form a 3- to 6-membered ring, and when one of the other pair of groups is not a pair of benzyl groups, then these each are an alkyl group of 1 to 4 carbon atoms or are connected to form a 3 to 6 member ring.

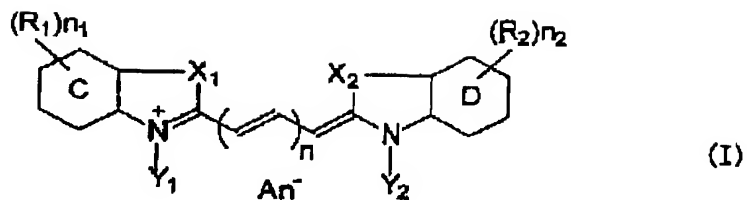
The Official Action refers to Formula 1 of JP '510, which is reproduced below.



However, Formula 1 of JP '510 clearly has only symmetric methyl substitution at the carbon atom attached to the 3-position of each nitrophenyl ring.

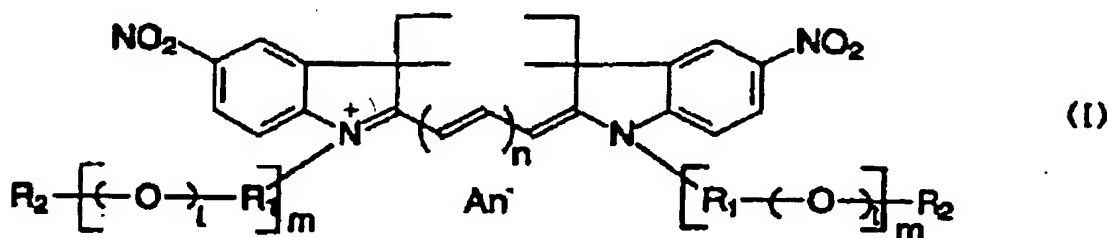
In contrast, claim 1 of the present invention includes an asymmetrical arrangement of R₁, R₂, R₃ and R₄ at these sites, with the juxtaposition of aromatic and alkyl groups discussed above.

The Official Action refers to Formula 1 of JP '233. However, there is no record of JP '233 in any PTO-1449 form or PTO-892 form of record in the application. An abstract and partial English translation obtained from the PAJ databases discusses a compound having a 1-oxyl-2,2,6,6-tetramethylpiperidyl group, and a compound of the formula (I):



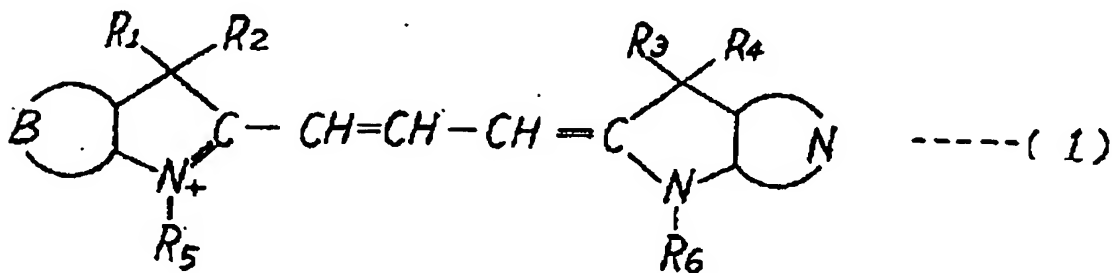
As a result, JP '223 appears to be cumulative of the other primary references.

The Official Action refers to Formula 1 of JP '335, which is reproduced below.



Analogous to JP '510, only symmetrical methyl or ethyl substitution is observed at the carbon atom attached to the 3-position of each nitrophenyl ring.

The Official Action refers to Figure 1 of the secondary reference of JP '426, which is reproduced below.



X⁻

The English Abstract of JP '426 states: "R1, R2, R3, R4, R5 and R6 independently hydrogen atom, alkyl group, alkoxyl group, alkylhydroxy group, alralkyl group, alkenyl group, alkylcarboxyl group, or alkylsulfonyl group."

The English Abstract of the secondary reference of JP '793 states that "R1, R2 and R3 are respectively independently an alkyl group which may be a 1-8C substituent, a phenyl group or a benzyl group."

The secondary reference of JP '746 only discloses molecules where each side is a mirror image of the other side (see formulas H1 to H9).

However, no combination of the primary and secondary references discloses or suggests a cyanine compound where, as is set forth in claim 1:

at least one of the pair of adjacent groups R1 and R2 and the pair of adjacent groups R3 and R4 represent a pair of benzyl groups, and the other paired groups each represent an alkyl group having 1 to 4 carbon atoms or are connected to each other to form a 3- to 6-membered ring, and when one of the other pair of groups is not a pair of benzyl groups, then these each are an alkyl group of 1 to 4 carbon atoms or are connected to form a 3 to 6 member ring.

Combining any of the primary with any of the secondary references would therefore not cause one of ordinary skill in the art to produce a cyanine compound as is set forth in claim 1 of the present invention. A *prima facie* case of unpatentability has

thus not been made. Claims depending upon claim 1 are patentable for at least the above reasons.

Even if one assumes *arguendo* that the applied art is sufficient to allege unpatentability, this unpatentability would be rebutted by the unexpected results of the invention.

The unexpected results of the present invention are typified by the data set forth in Table 1 of the specification, where the compounds of the present invention have a low thermal decomposition temperature, thus proving that the materials of the present invention are suitable as an optical recording material fit for high-speed processing.

Additional data for the present invention are set forth in Table 2 of the specification, which shows that compounds of the present invention are suited to write and read at wavelengths that are the standards of DVD-Rs.

The advantages of the cyanine dyes of the present invention are thus clearly unexpected in light of the conventional compounds typified by the primary and secondary references.

This rejection is believed to be overcome, and withdrawal thereof is respectfully requested.

Double Patenting Rejection

Claims 1 and 3-5 have been provisionally rejected on the grounds of non-statutory obviousness-type double patenting as being unpatentable over claims 1-12 of co-pending application No.

11/257,325 (U.S. Publication 2006/0110566). This rejection is respectfully traversed.

The co-pending application was filed on October 24, 2005, and the present application was filed on January 30, 2006. Pursuant to MPEP §804, the Examiner is respectfully requested to allow the first application to pass to allowance with a finalized set of claims before any double patenting rejection is pursued in the later filed application.

This rejection is believed to be overcome and withdrawal thereof is respectfully requested.

Conclusion

The Examiner is thanked for considering the Information Disclosure Statements filed January 30, 2006 and April 28, 2006, and for making the initialed PTO-1449 forms of record in the application.

Prior art cited but not utilized is believed to be non-pertinent to the instant claims.

The rejections are believed to be overcome, obviated or rendered moot, and that no issues remain. The Examiner is accordingly respectfully requested to place the application in condition for allowance and to issue a Notice of Allowability.

The Commissioner is hereby authorized in this, concurrent, and future replies, to charge payment or credit any

overpayment to Deposit Account No. 25-0120 for any additional fees required under 37 C.F.R. § 1.16 or under 37 C.F.R. § 1.17.

Respectfully submitted,

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